ILLINOIS ENVIRONMENTAL PROTECTION AGENCY



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LISA BONNETT, DIRECTOR

217/785-7728

February 25, 2015

Mr. Rosauro del Rosario United States Environmental Protection Agency Superfund Division, Mail Code SR-6J 77 West Jackson Boulevard Chicago, Illinois 60604-3590

Re: I

Focused Feasibility Study,

Revision 1 ILD984809228 097190058 -- Lake County Waukegan/NSG South Plant MGP Site Superfund/Technical Reports

Mr. del Rosario:

On February 11, 2015, the Illinois Environmental Protection Agency (Illinois EPA) received the Focused Feasibility Study Report, North Shore Gas Company, Former Waukegan South Plant MGP Site, Waukegan, Illinois, project No: 1983, Revision 1 [FFS]. The document was prepared by Natural Resource Technology, Inc. on behalf of Integrys Business Support, LLC (IBS). IBS manages the site for its subsidiary, North Shore Gas Company (NSG).

The FFS for the former South Plant Manufactured Gas Plant (MGP) was developed in accordance with the July 2007 Administrative Order on Consent (AOC) between the United States Environmental Protection Agency (USEPA) and NSG. The Waukegan South Plant is one of 13 former MGP Sites in Chicago and Waukegan being addressed by IBS as National Priorities List (NPL) Alternative Sites. Responses to Illinois EPA comments on the previous iteration of the FFS were included with the submission. The responses to comments are acceptable.

Illinois EPA requests that the following additional comments be addressed prior to finalizing the FFS:

Section 4.3, D2 - Institutional Controls, pages 26-27: Sufficient description is provided for
institutional controls to prevent the use of groundwater as a drinking water source. However,
more detail is indicated to describe how worker caution controls for the protection of future
construction workers will be implemented and enforced, especially for impacted areas
located on adjacent properties.

Mr. Ross del Rosario, USEPA FFS Revision 1 February 25, 2015 0971900058 - Lake County Waukegan/NSG South Plant MGP Superfund/Technical Reports

- 2. Section 4.5.2, D4 Horizontal Well DNAPL Recovery: No discussion could be found in this section explaining how recovery system effluent (DNAPL and water) will be stored, treated and/or disposed. Please revise this section to describe the fate of effluent recovered from the horizontal well system. It is noted that the Alternative D4 cost estimate found in Appendix B assumes drumming the DNAPL/water and transport of these drums to an SET facility in Houston, Texas.
- 3. Section 4.6.4, D5 Compliance with ARARs, page 45: Regarding the conditions Illinois EPA has for potential re-injection of treated DNAPL/water as part of this interim action, please add the following as the final bullet on page 45, "The interim action will not be inconsistent with the final remedial action goal of remediating contaminated groundwater to Illinois' Class 1 Groundwater Quality Standards."
- 4. Section 4.8.2, D7 Remedial Option Description, page 56: The text discusses the increased risk of vapor intrusion associated with the Thermally Enhanced Recovery options. At a minimum, increased soil vapor and potentially indoor air monitoring are indicated to ensure the protection of users of the Akzo facility buildings and the WPD Maintenance Building during implementation of this alternative. Accordingly, please revise this section and Section 4.8.7 (Short-Term Effectiveness) to include adequate soil vapor and/or indoor air monitoring for the protection of indoor workers as part of this remedial alternative.
- 5. Section 6, General: The stepped approach for South Plant is laid out in this section. Up to three of the remedial alternatives could be implemented. The first step would involve Horizontal Well DNAPL Recovery (D4), which is a passive technique. If recovery rates for D4 indicate enhanced recovery techniques should be implemented, then the recovery system would be upgraded to Physically Enhanced DNAPL Recovery (D5) or water flushing. If deemed necessary, the infrastructure for D5 could be re-purposed to accommodate Chemically Enhanced DNAPL Recovery (D6). Implementation of D4 alone is estimated to achieve 95% total DNAPL recovery in approximately 31 years. The enhanced alternatives are expected to take considerably less time, 5 to 8 years, to achieve the same 95% reduction. As long as IBS demonstrates that it can meet the re-injection conditions identified by Illinois EPA, selection of Alternative D5 is the preferred first step alternative for Illinois EPA.
- 6. Table 1: Illinois EPA is cognizant that the alternatives in this FFS only address the mass and mobility of principle threat MGP waste at the site, which is dense non-aqueous liquids (DNAPL). As such, no attempt at meeting Illinois' Groundwater Quality Standards (35 IAC 620) is contemplated for this interim action. Rather, restoring groundwater to beneficial use levels will occur as part of follow-on work once the principle threat waste has been addressed to the extent practicable. However, since the long-term goal is to meet the 35 IAC 620 standards, they should be listed as applicable chemical-specific applicable or relevant and appropriate requirements (ARARs), not "relevant and appropriate."

Should you have any questions regarding this letter, please do not hesitate to contact me at 217/785-7728 or by e-mail at Paul.Lake@illinois.gov.

Sincerely,

Paul T. Lake,

Federal Site Remediation Section

Bureau of Land

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cc: David Klatt, CH2MHill